

Claim Amendments

Please cancel claims 45 and 46, amend claims 3 – 7, 10, 11, 15 -19, 22 -33, 35 - 41, 43, 44, 47 – 49, and add new claims 51 and 52 as follows:

Claims 1-2 (canceled).

3. (currently amended) A method, comprising:

determining, among a plurality of input video frames in a bitstream, at least one video frame for video editing, wherein the input video frames comprise frame characteristics, the frame characteristics comprising at least a first characteristic and a second characteristic, and wherein the input video frames comprise one or more preceding video frames preceding said at least one video frame;

identifying the frame characteristic of said at least one input video frame; in a bitstream, wherein the input video frame comprises video data; and

modifying the bitstream in the compressed domain based on the frame characteristic of said at least one video frame and specified editing parameters for providing a modified bitstream indicative of edited video frames if the frame characteristic of said at least one video frame is the first characteristic, and wherein if the frame characteristic of said at least one video frame is the second characteristic, decoding said at least one video frame and at least one of said preceding video frames for providing a plurality of decoded video frames prior to said modifying, wherein the video data are coded with a variable length code (VLC), said method further comprising:
—converting the VLC coded video data into a binary form prior to said modifying.

4. (currently amended) The method of claim 3, wherein the input video frames comprise video data coded with a variable length code (VLC), said method further comprising:

inversely quantizing converting the VLC coded video data into a binary form
prior to said ~~converting~~ modifying.

5. (currently amended) The method of claim ~~[[3]]~~ 4, further comprising:

processing the VLC coded video data in an inverse cosine transform operation prior to said converting.

6. (currently amended) The method of claim 3, further comprising:

~~identifying frame characteristics of at least one further video frame in the bitstream; and~~

modifying one or more further input video frames in the bitstream in a further domain different from the compressed domain ~~based on the frame characteristics of said at least one further video frame~~ for providing a further modified video bitstream.

7. (currently amended) The method of claim 6, further comprising:

combining at least a part of the further modified video bitstream with at least a part of the modified bitstream.

8. (original) The method of claim 6, wherein said further domain comprises a spatial domain.

9. (original) The method of claim 6, wherein said further domain comprises a file format domain.

10. (currently amended) The method of claim 3, wherein the ~~edited~~ modified video bitstream comprises frames comprise edited frame data, said method further comprising:

converting the edited frame data into an edited media file ~~for use in a media player~~.

11. (currently amended) The method of claim 10, ~~further comprising:~~

~~—~~ providing wherein the edited frame data is converted base on format information indicative of editing properties of the edited frame data ~~so as to convert the edited frame data into the edited media file compatible to the media player.~~

12. (original) The method of claim 10, wherein the bitstream also comprises audio data separable from the video data in the input video frames, said method further comprising:
combining the audio data with the edited frame data prior to said converting.
13. (previously presented) The method of claim 12, further comprising:
modifying the audio data prior to said combining.
14. (previously presented) The method of claim 12, further comprising:
providing timing information so as to maintain synchronization between the audio data and edited frame data in said combining.
15. (currently amended) The method of claim 3, wherein said modifying is also based on the editing parameters according to a user's chosen editing reference ~~are specified based on one or more editing preferences chosen by a user.~~
16. (currently amended) An apparatus, comprising:
a frame analyzer module, responsive to signals indicative of a plurality of input video frames in a bitstream, adapted for determining at least one video frame for video editing, wherein the input video frames comprise video frame data, for identifying frame characteristics, the frame characteristics comprise a first characteristic and a second characteristic, and wherein the input video frames comprise one or more preceding video frames preceding said ~~[[of]]~~ at least one input video frame, said frame analyzer module further adapted for identifying the frame characteristic of said at least one video frame in a bitstream; and
a compressed domain processing module, responsive to signals indicative of the frame characteristic of said at least one video frame ~~characteristics~~, for modifying the video frame data based on ~~the frame characteristics of said at least one frame and~~ specified editing parameters for providing a modified bitstream indicative of edited video frames if the frame characteristic of said at least one video frame is the first characteristic; and

a decoding module, adapted for decoding said at least one video frame and at least one of said preceding video frames for providing a plurality of decoded video frames prior to said modifying, if the frame characteristic of said at least one video frame is a second characteristic, data indicative of edited video frames, wherein the video data are coded with a variable length code (VLC), and the VLC coded video data is converted into a binary form prior to said modifying.

17. (currently amended) The apparatus of claim 16, ~~wherein the frame analyzer further identifies frame characteristics of at least one further video frame in the bitstream, said device further comprising:~~

~~a spatial domain processing module, responsive to signals indicative of the frame characteristics of the further video frame, for modifying video frame data in [[the]] one or more further input video frames in the bitstream in a spatial domain frame based on the frame characteristics of the further video frame for providing further modified video data.~~

18. (currently amended) The apparatus of claim 17, further comprising:

~~a combining module for combining at least a part of the further modified video data with at least a part of the modified bitstream video data.~~

19. (currently amended) The apparatus of claim 16, further comprising:

~~a format composer module, responsive to signals indicative of the modified video data, for converting the modified video data into an edited media file for use in a media player.~~

20. (previously presented) The apparatus of claim 19, wherein the format composer module comprises a file format composer.

21. (previously presented) The apparatus of claim 19, wherein the format composer module comprises a media format composer.

22. (currently amended) The apparatus of claim 19, wherein the frame analyzer module is further identifies adapted for identifying format information indicative of editing properties of the modified video data so as to convert the modified video data into the edited media file compatible to ~~[[the]]~~ a media player.

23. (currently amended) The apparatus of claim 16, wherein the bitstream also comprises audio data, said ~~device~~ apparatus further comprising:

a format parser module, for separating the audio from the video frame data in the input video frames, and

an audio processing module adapted for modifying the audio data for providing modified audio data, if so desired.

24. (currently amended) The apparatus of claim ~~[[21]]~~ 23, further comprising:

a combination module for combining the modified video data and the modified audio data for providing combined signals indicative of ~~[[the]]~~ combined data.

25. (currently amended) The apparatus of claim ~~[[22]]~~ 24, further comprising:

a format composer, responsive to the combined signals, for converting the combined data into an edited media file for use in a media player.

26. (currently amended) An apparatus ~~A media coding system~~, comprising:

a media encoder for encoding media data for providing encoded media data in a plurality of encoded video frames, wherein the encoded video frames comprise frame characteristics, the frame characteristics comprising at least a first characteristic and a second characteristic ~~having frame data~~;

a media editing device, responsive to the encoded video frames ~~media data~~, for providing edited data including one or more edited frames, the edited frames having a least one editing effect specified by one or more editing parameters, and

a media decoder, responsive to the edited data, for providing decoded media data, wherein the media editing device comprises:

a ~~frame analyzer~~ video editor module, responsive to signals indicative of encoded video frames data, ~~for identifying frame characteristics of~~ adapted for determining at least one video frame for video editing, and wherein the encoded video frames comprise one or more preceding video frames preceding said at least one video frame, said video editor module further adapted for identifying the frame characteristic of said at least one video frame ~~in the encoded data~~; and;

a compressed domain processing module, responsive to signals indicative of the frame characteristic of said at least one video frame ~~characteristics~~, for modifying the encoded frame data based on ~~the frame characteristics of said at least one frame and the~~ specified editing parameters for providing the edited data if the frame characteristic of said at least one video frame is the first characteristic; and

a further module, adapted for decoding said at least one video frame and at least one of said preceding video frames for providing a plurality of decoded video frames, the decoded video frames comprise a last decoded video frame, and encoding the last decoded video frame prior to said modifying if the frame characteristic of said at least one video frame is the second characteristics ~~modified media data indicative of said edited media frames, wherein the video data are coded with a variable length code (VLC), and wherein the VLC coded video data is converted into a binary form prior to said modifying.~~

27. (currently amended). The ~~media coding system~~ apparatus of claim 26, wherein the media encoder has a connectivity mechanism and the media editing device has a further connectivity mechanism ~~so as to allow for allowing the media~~ editing device to communicate with the media ~~decoder~~ encoder in order to receive therefore encoded media data in a wireless fashion.

28. (currently amended) The ~~media coding system~~ apparatus of claim 26, wherein the media decoder has a connectivity mechanism and the media editing device has a further connectivity mechanism ~~so as to allow for allowing the media~~ editing device to provide the edited data to the media decoder in a wireless fashion.

29. (currently amended) The ~~media coding system~~ apparatus of claim 26, wherein the media encoder and the media editing device are integrated in an expanded encoding module system.

30. (currently amended) The ~~media coding system~~ apparatus of claim 29, wherein the media decoder has a connectivity mechanism and the expanded encoding module system has a further connectivity mechanism ~~so as to allow~~ for allowing the expanded encoding module system to provide the edited data to the media decoder in a wireless fashion.

31. (currently amended) The ~~media coding system~~ apparatus of claim 26, wherein the media decoder and the media editing device are integrated in an expanded decoding module system.

32. (currently amended) The ~~media coding system~~ apparatus of claim 31, wherein the media encoder has a connectivity mechanism and the expanded decoding ~~system~~ module has a further connectivity mechanism ~~so as to allow~~ for allowing the media encoder to provide the edited data to the expanded decoding ~~system~~ module in a wireless fashion.

33. (currently amended) The ~~media coding system~~ apparatus of claim 30, wherein each of the connectivity mechanism and the further connectivity mechanism comprises a bluetooth connectivity module.

34. (original) The media coding system of claim 30, wherein each of the connectivity mechanism and the further connectivity mechanism comprises an infra-red connectivity module.

35. (currently amended) An apparatus configured for editing media files in a bitstream, the bitstream comprising a video bitstream and an audio bitstream, wherein the video bitstream comprises a plurality of input video frames having video frame data, comprising:

a video editing application module for specifying editing effects on the input video frames, the input video frames comprising at least one video frame for video editing and a plurality of preceding video frames preceding said at least one video frame, wherein the input video frames comprise frame characteristics, the frame characteristics comprising a first characteristic and a second characteristic data; and

a video editing ~~system~~ device comprising:

an editor module adapted for identifying the frame characteristic of said at least one video frame; and

a compressed domain processing module, responsive to signals indicative of the frame characteristic of said at least one video frame ~~input video frames~~, for modifying at least part of the video frame data in said one or more video frames based on frame and specified editing effects for providing modified video data if the frame characteristic of the first characteristic; and

a further module, adapted for decoding said at least one video frame and at least one of said preceding video frames for providing a plurality of decoded video frames, the decoded video frames comprising a last decoded video frame, said further module further adapted for encoding said last decoded video frame prior to said modifying if the frame characteristic of said at least one video frame is the second characteristic indicative of edited video frames; wherein the video frame data is coded with a variable length code (VLC), and wherein the VLC coded video data is converted into a binary form prior to said modifying.

36. (currently amended) The ~~communications device~~ apparatus of claim 35, wherein the video frame data is coded with a variable length code (VLC), and wherein the VLC coded video data is converted into a binary form prior to said modifying said video editing system further comprises:

~~—— a frame analyzer module, responsive to signals indicative of the video frame data, for identifying frame characteristics of at least one input video frame, so as to allow the compressed domain processing module to modify the video frame data also based on the frame characteristics.~~

37. (currently amended) The ~~apparatus~~ communications device of claim 36, ~~wherein the frame analyzer further identifies frame characteristics of at least one further video frame in the bitstream, and wherein the video editing system device~~ further comprises:

a spatial domain processing module, ~~responsive to signals indicative of the frame characteristics of the further video frame, for modifying video frame data in [[the]] one or more further input video frames in a spatial domain frame based on the frame characteristics of the further video frame and the specified editing parameters for providing further modified video data.~~

38. (currently amended) The ~~communications device~~ apparatus of claim 37, wherein the video editing ~~system device~~ further comprises:

a module for combining at least a part of the further modified video data with at least a part of the modified video data.

39. (currently amended) The ~~communications device~~ apparatus of claim 35, wherein the video editing ~~system device~~ further comprises:

a format composer module, responsive to signals indicative of the modified video data, for converting the modified video data into an edited media file ~~for use in a media player.~~

40. (currently amended) The ~~communications device~~ apparatus of claim 35, further comprising:

a display screen for display video images based on modified video data.

41. (currently amended) The ~~communications device~~ apparatus of claim 35, comprising a mobile terminal.

42. (canceled).

43. (currently amended) A computer readable medium embedded therein in a software program, said software program comprising programming codes for:

~~identifying frame characteristics of at least one input video frame in a bitstream;~~
~~modifying video data in one or more input video frames in the compressed domain based on the frame characteristics of said at least one frame and specified editing parameters for providing a modified video data indicative of edited video frames, wherein the input video frames contain video data coded with variable length code (VLC), and~~
~~a code for converting the VLC coded video data into a binary form prior to modification of video data in one or more input video frames~~ carrying out the method of claim 3.

44. (currently amended) The computer readable medium of claim 43, wherein the software program further comprises~~identifying code also identifies frame characteristics of at least one further input video frame, said software product further comprising~~
a code for modifying video data in one or more further input video frames in a further domain different from the compressed domain based on the frame characteristics of said further input video frame and the specified editing parameters so as to provide modified further video data.

45. (canceled)

46. (canceled)

47. (currently amended) The computer readable medium of claim 44, ~~further comprising wherein the software program further comprises:~~
a code for combining the modified further video data with the modified video data for providing the edited video frames.

48. (currently amended) The computer readable medium of claim 42, wherein the software program further comprises ~~comprising:~~
a code for converting the modified video data into an edited media file for use in a media player.

49. (new) An apparatus, comprising:

means for determining, among a plurality of input video frames in a bitstream, at least one video frame for video editing, wherein the input video frames comprises frame characteristics, the frame characteristics comprising at least a first characteristic and a second characteristic, and wherein the input frames comprise one or more preceding video frames preceding said at least one video frame;

means for identifying the frame characteristics characteristic of said at least one input video frame in a bitstream, wherein the input video frame comprises video data, and

means for modifying at least part of the bitstream in the compressed domain based on the frame characteristics of said at least one frame and specified editing parameters for providing a modified bitstream indicative of edited video frames if the frame characteristic of said at least one video frame is the first characteristic, and

means for decoding said at least one video frame and at least one of said preceding video frames providing a plurality of decoded video frames, including a last decoded video frames if the frame characteristic of said at least one video frame is the second characteristic; and means for encoding the last decoded video frame, wherein the video data are coded with a variable length code (VLC), and wherein the VLC coded video data is converted into a binary form prior to said modifying.

50. (previously presented) The apparatus of claim 49, further comprising:

means for converting the edited video frames into an edited media file.

51. (new) The method of claim 1, wherein said plurality of decoded video frames comprises a last decoded frame, said method further comprising:

encoding the last decoded frame prior to said modifying.

52. (new) The apparatus of claim 16, wherein said plurality of decoded video frames comprises a last decoded frame, said apparatus further comprising:

an encoding module, for encoding the last decoded frame prior to said modifying.